

CLAIM OR CLAIMS

WHAT IS CLAIMED IS:

1. An apparatus for creating a protocol stack comprising:
 - 5 a protocol layer with a standardized interface; and
 - an instance for the administration of the protocol stack that contains the protocol layer.
- 10 2. The apparatus as recited in claim 1 wherein the protocol layer comprises a description file in which a characteristic of the protocol layer is described.
- 15 3. The apparatus as recited in claim 2 further comprising means for linking the description files of components of the protocol layer with each other.
4. The apparatus as recited in claim 1 wherein the instance comprises:
 - a local emulation manager that is assigned to the protocol layer; and
 - 20 a global emulation manager that is linked to the local emulation manager.
5. The apparatus as recited in claim wherein the protocol layer has a Service Access Point, with the Service Access Point having an input and/or an output to another Service Access Point.
- 25 6. The apparatus as recited in claim 4 wherein the protocol layer comprises

an input and an output to connect with the local emulation manager.

7. The apparatus as recited in claim 1 wherein the protocol layer is configured to be connected with at least two higher protocol layers and at 5 least two lower protocol layers.

8. The apparatus as recited in claim 2 wherein the characteristic comprises:
a description of a Service Access Point as a list of primitives that may
be exchanged via the Service Access Point; and
10 parameters of the protocol layer; and
actions of the protocol layer.

9. The apparatus as recited in claim 8 wherein the primitives are shown as
standardized structures and standardized coding.
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10. The apparatus as recited in claim 8 further comprising a communication
function for giving the Service Access Point the same form as the instance.

11. The apparatus as recited in claim 1 further comprising an interaction
20 element via which a user interacts with the protocol layer.

12. The apparatus as recited in claim 11 further comprising a script
interpreter that is incorporated by the interaction element into the protocol
stack so that the user acts on the protocol stack.

13. The apparatus as recited in claim 1 further comprising a graphical user interface for putting together the protocol stack.

14. The apparatus as recited in claim 13 wherein protocol-layer-specific information is made available via the graphical user interface.

5 15. The apparatus as recited in claim 14 wherein the protocol-layer-specific information comprises:

adjustable and constant parameters of the protocol layer; and

10 actions of the protocol layer, the parameters and actions being modifiable by the user.

16. A method of creating a protocol stack comprising the steps of:

making available a protocol layer with a standardized interface;

15 randomly compiling the protocol stack containing the protocol layer;

and

making available an instance for the administration of the protocol stack.

20 17. An apparatus for creating a protocol stack comprising:

a plurality of local emulation managers, each local emulation manager being coupled to a protocol layer emulation with the protocol layer emulation having a standardized interface;

a global emulation manager linked to the local emulation managers to

form an administration instance; and

means for interacting with the administration instance to provide administrative commands for loading and connecting elements including the protocol layer emulations to create the protocol stack.